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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/669,967	09/23/2003	Paul Chi-Sing Poon		4869

7590 03/15/2007  
PAUL POON  
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SAN JOSE, CA 95129

EXAMINER
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NEWAY, SAMUEL G

ART UNIT	PAPER NUMBER
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2626

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
3 MONTHS	03/15/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

**Office Action Summary**

Application No.

10/669,967

Applicant(s)

POON, PAUL CHI-SING

Examiner

Samuel G. Neway

Art Unit

2626

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 23 September 2003.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-7 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-7 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on 26 January 2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)          | 4) <input type="checkbox"/> Interview Summary (PTO-413)           |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____                                      |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)          | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____  | 6) <input type="checkbox"/> Other: _____                          |

### **DETAILED ACTION**

1. This is responsive to the Application filed on September 23, 2003.

#### ***Specification***

2. The amendment filed May 05, 2006 is objected to under 35 U.S.C. 132(a) because it introduces new matter into the disclosure. 35 U.S.C. 132(a) states that no amendment shall introduce new matter into the disclosure of the invention. The added material which is not supported by the original disclosure is as follows: the theories of Finite State Automata (FSA) were not disclosed in the original filing.

Applicant is required to cancel the new matter in the reply to this Office Action.

#### ***Claim Objections***

3. Claim 1 is objected to because of the following informalities:

Claim 1 recites the limitation "the set of predefined sequences" in line 6. There is insufficient antecedent basis for this limitation in the claim. The Examiner will read this limitation as 'a set of predefined sequences'.

Claim 1 recites the limitation "the other sequence" in line 15. There is insufficient antecedent basis for this limitation in the claim. The Examiner will read this limitation as 'another sequence'.

#### ***Claim Rejections - 35 USC § 112***

4. The following is a quotation of the second paragraph of 35 U.S.C. 112:

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The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

5. Claim 7 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claim 7 recites the phrase "a plurality of key sequences whereas the plurality arises as a result" in line 8. It is unclear as to what this phrase is meant to cover. The Examiner will read this phrase as 'a plurality of key sequences wherein the plurality of key sequences arise as a result'.

#### ***Claim Rejections - 35 USC § 101***

6. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

7. Claims 1 – 5, and 7 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.

Claims 1 – 5, and 7 are directed to encoding Chinese characters; however, they do not result in a physical transformation nor do they appear to provide a useful, concrete, and tangible result. Specifically, the claims do not appear to produce a tangible result because merely encoding Chinese characters is nothing more than a thought or a computation within a processor. They fail to use or make available for use the result of the interpretation to enable its functionality and usefulness to be realized.

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The practical application is not explicitly recited in the claims nor does it flow inherently therefrom. Therefore, claims 1 – 5, and 7 are non-statutory.

On the other hand, displaying the characters as in claim 6 will produce a useful, concrete, and tangible result.

***Claim Rejections - 35 USC § 102***

8. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

9. Claims 1, 3 – 7 are rejected under 35 U.S.C. 102(b) as being anticipated by Pong (USPN 5,212,769).

Claim 1:

Pong discloses a Chinese character input method wherein Chinese characters are defined as key sequences and selected by matching a given sequence against a set of predefined sequences (Abstract), wherein the improvement comprises:

sequence comparison method in which a key or consecutive run of keys from one sequence is considered a match to a key or consecutive run of keys in another sequence in accordance with a predefined mapping of keys and runs of keys ("Each character corresponding to the character stroke code is then retrieved from a pre-stored character set", col. 4, lines 27-30).

Claim 3:

Pong discloses the method of claim 1, further comprising a method of encoding Chinese characters as text strings of another language wherein certain letters used in an encoding are defined to carry certain positional information relating to the components of the Chinese character represented by the encoding ("It is noted that this code is indicative of the initial order ... in which the different types of basic stroke elements occur ...", col. 9, lines 14-19).

Claim 4:

Pong discloses the method of claim 1, further comprising a method of specifying a Chinese character encoding as a text string of another language wherein certain letters present in the specifying string are defined to bear special instructions for the method of claim 1 ("FIG. 6 and related text").

Claim 5:

Pong discloses the method of claim 1, further comprising defining each letter of the English alphabet as a representation of one or more Chinese language strokes, stroke combinations, or radicals, as depicted in FIG. 1 (FIG. 6 and related text).

Claim 6:

Pong discloses the method of claim 1, further comprising a selection technique whereby a set of candidate characters is displayed for user selection by the user entering a symbol which serves as an identifier of the desired candidate wherein the set of identifier symbols overlaps the set of symbols used in defining the Chinese characters themselves, including the character(s) used as termination of the definitions ("the user would select from the displayed characters the one which is being encoded,

and enter the letter associated with the selected character to obtain an extended character stroke code which uniquely corresponds to the character being encoded", col. 12, lines 54-60).

**Claim 7:**

Pong discloses a Chinese character input method wherein Chinese characters are defined as key sequences and are selected based on matching a given sequence to the set of predefined sequences (Abstract), wherein the improvement comprises:

a character identification method in which certain strokes and components of the Chinese written language are respectively mapped to certain keys, and in which a Chinese character is identifiable by a plurality of key sequences wherein the plurality of key sequences arise as a result of specifying certain component(s) contained in the character either as a single key representing the component ("Typing" mode), or as a sequence of keys representing the constituent strokes and components of the component ("Stroke Grouping" mode)("This example demonstrates five different techniques for entering and encoding the Chinese character ... using the keys from the keyboard", col. 17, lines 24-26. See also FIG. 6 and related text).

***Claim Rejections - 35 USC § 103***

10. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

11. Claim 2 is rejected under 35 U.S.C. 103(a) as being unpatentable over Pong (USPN 5,212,769) in view of Hsieh (USPN 5,047,932).

Claim 2:

Pong discloses the method of claim 1, but he does not explicitly disclose the method further comprising a method of comparing a given sequence to a predefined one wherein, without the use of a designated 'wildcard' symbol, a match is achieved when the given sequence only matches parts of the predefined sequence.

Hsieh discloses a similar method of encoding Chinese characters for keyboard input where he teaches partial matches as claimed in the instant claim ("When a single Chinese character is to be output, its instruction code includes an English letter phonetically resembling the first phonetic symbol of this character", col. 4, lines 7-11).

Therefore, it would have been obvious to one with ordinary skill in the art at the time of the invention to partially match parts of a sequence in Pong's method so that the "information can be rapidly processed" (Hsieh, col. 1, lines 29-33).

***Conclusion***

12. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Hua (USPN 5,378,068) discloses a word processor for producing Chinese characters using a standard keyboard.

Leban et al. (USPN 4,490,789) discloses a method for reproducing Chinese characters by feeding into a computer symbols defining the gross form of each



character, then feeding in successive pairs of symbols, with one symbol in each pair defining an element of the character and another symbol defining the juxtaposition of each element relative to previous elements.

13. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Samuel G. Neway whose telephone number is 571-270-1058. The examiner can normally be reached on Monday - Friday 8:30AM - 5:30PM EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David R Hudspeth can be reached on 571-272-7843. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

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